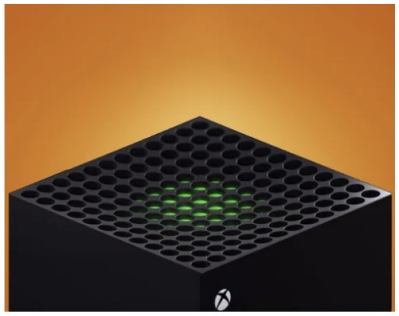
Exhibit 2

Microsoft – Xbox with Ray Traced Audio feature (See Product List at end of chart for models) Infringement of the '883 patent	
Claim #1	**Evidence**
1. A method for processing concurrent signals, comprising:	The Microsoft Xbox game console with ray traced audio performs a method processing concurrent signals. For example, the Xbox Series X game console includes hardware accelerated ray traced audio. The console uses a custom designed AMD graphics processing unit (GPU), model name Scarlett, having an RDNA 2.0 architecture, which is the series RX6000 GPUs that support ray traced audio (referred to by AMD as TrueAudio Next). Ray traced audio acceleration is the latest gimmick on Microsoft's Xbox Series X console *Is Microsoft trying to prove that sounds exhibit the same wave-particle duality as light rays? Probably not. This is most likely a clever marketing gimmick that feeds off of the growing popularity of ray traced graphics and mainstream gamers are not even supposed to benefit from it.* *Bogdan Solca, Published 02/27/2020* AMD Audio Console Gaming Ryzen (Zen) Zen  *The ray traced audio processing on the Xbox Series X might require very expensive speakers or headphones. (Image Sources: GamesRadar)* A few days ago, Microsoft unveiled some more key technical specs for the upcoming Xbox Series X console so we now know that there will be hardware-level ray trace acceleration. An earlier leak specified that the next gen console will support spatial audio acceleration, as well, and director of Xbox program management Jason Ronald essentially confirmed this in a recent podcast where he mentioned that the spatial audio features will be handled by the ray tracing accelerator:

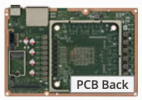
	[6] **Hardware Accelerated DirectX Raytracing (DXR)** – From improved lighting, shadows and reflections as well as more realistic acoustics and spatial audio, raytracing enables developers to create more physically accurate worlds. For the very first time in a game console, Xbox Series X and Xbox Series S include support for high performance, hardware accelerated raytracing. Xbox Series X and Xbox Series S use a custom-designed GPU leveraging the latest innovation from our partners at AMD and built in collaboration with the same team who developed DirectX Raytracing. Developers will be able to deliver incredibly immersive visual and audio experiences using the same techniques on PC and beyond. [7] **Project Acoustics** – Incubated over a decade by Microsoft Research, Project Acoustics accurately models sound propagation physics in mixed reality and games, employed by many AAA experiences today. It is unique in simulating wave effects like diffraction in complex scene geometries without straining CPU, enabling a much more immersive and lifelike auditory experience. Plug-in support for both the Unity and Unreal game engines empower the sound designer with expressive controls to mold reality. Developers will be able to easily leverage Project Acoustics with Xbox Series X and Xbox Series S through the addition of a new custom audio hardware block. [7]

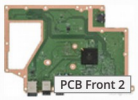
GPU Database ▸ Xbox Series X GPU Specs

AMD Xbox Series X GPU

Report an Error

Scarlett	3328	208	64	10 GB	GDDR6	320 bit
GRAPHICS PROCESSOR	CORES	TMUS	ROPS	MEMORY SIZE	MEMORY TYPE	BUS WIDTH



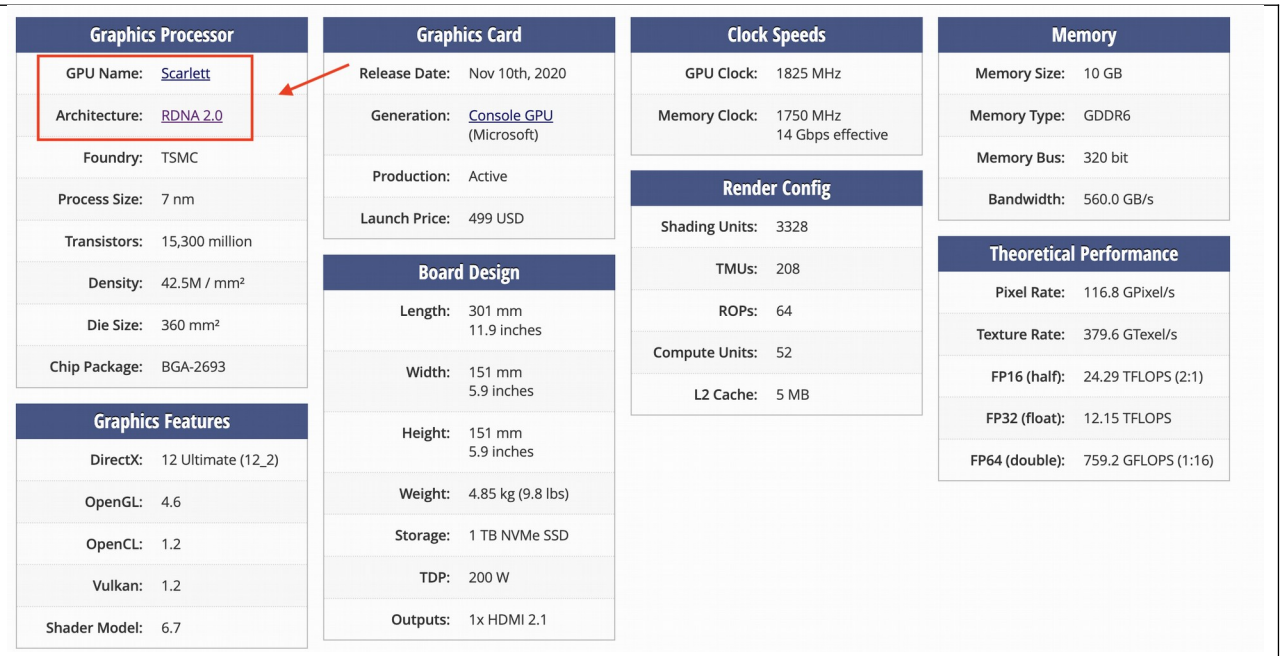


Recommended Gaming Resolutions: 1920x1080 2560x1440 3840x2160

The Xbox Series X GPU is a high-end gaming console graphics solution by AMD, launched on November 10th, 2020. Built on the 7 nm process, and based on the Scarlett graphics processor, the device supports DirectX 12 Ultimate. The Scarlett graphics processor is a large chip with a die area of 360 mm² and 15,300 million transistors. It features 3328 shading units, 208 texture mapping units, and 64 ROPs. AMD includes 10 GB GDDR6 memory, which are connected using a 320-bit memory interface. The GPU is operating at a frequency of 1825 MHz, memory is running at 1750 MHz (14 Gbps effective).

Its power draw is rated at 200 W maximum. The console's dimensions are 301 mm x 151 mm x 151 mm, and it features a igp cooling solution. Its price at launch was 499 US Dollars.

[8]



Graphics Processor

GPU Name:	Scarlett
Architecture:	RDNA 2.0
Foundry:	TSMC
Process Size:	7 nm
Transistors:	15,300 million
Density:	42.5M / mm²
Die Size:	360 mm²
Chip Package:	BGA-2693

Graphics Card

Release Date:	Nov 10th, 2020
Generation:	Console GPU (Microsoft)
Production:	Active
Launch Price:	499 USD

Clock Speeds

GPU Clock:	1825 MHz
Memory Clock:	1750 MHz 14 Gbps effective

Memory

Memory Size:	10 GB
Memory Type:	GDDR6
Memory Bus:	320 bit
Bandwidth:	560.0 GB/s

Graphics Features

DirectX:	12 Ultimate (12_2)
OpenGL:	4.6
OpenCL:	1.2
Vulkan:	1.2
Shader Model:	6.7

Board Design

Length:	301 mm 11.9 inches
Width:	151 mm 5.9 inches
Height:	151 mm 5.9 inches
Weight:	4.85 kg (9.8 lbs)
Storage:	1 TB NVMe SSD
TDP:	200 W
Outputs:	1x HDMI 2.1

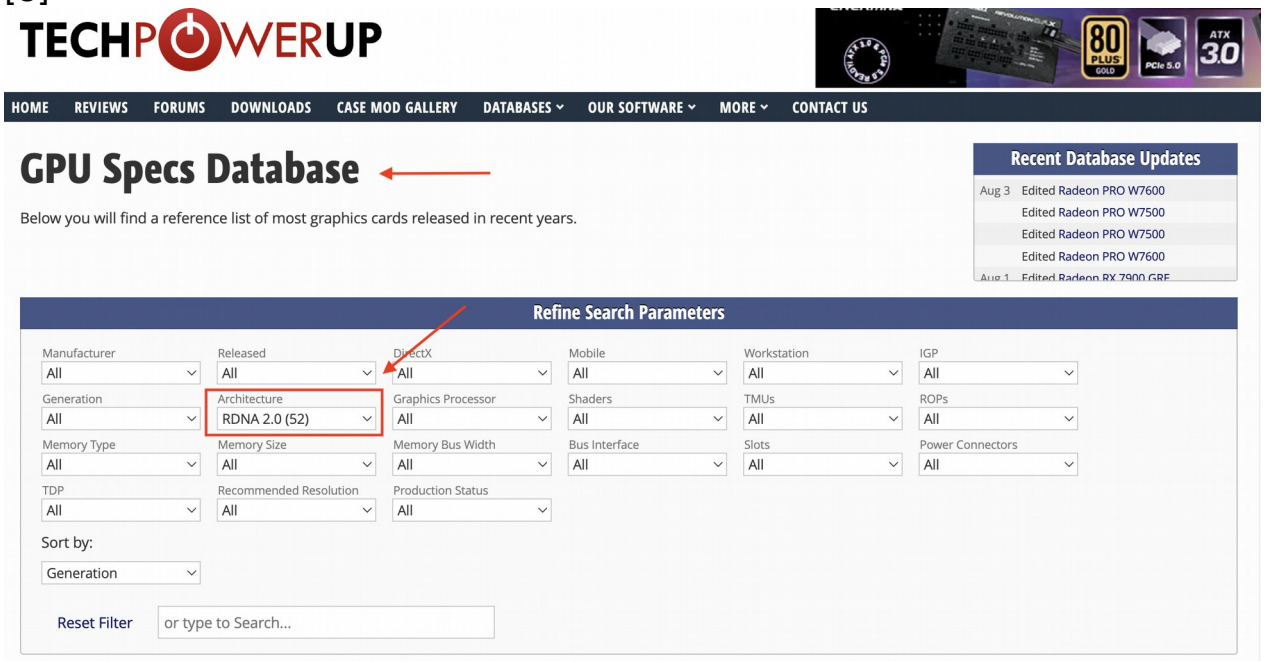
Render Config

Shading Units:	3328
TMUs:	208
ROPs:	64
Compute Units:	52
L2 Cache:	5 MB

Theoretical Performance

Pixel Rate:	116.8 GPixel/s
Texture Rate:	379.6 GTexel/s
FP16 (half):	24.29 TFLOPS (2:1)
FP32 (float):	12.15 TFLOPS
FP64 (double):	759.2 GFLOPS (1:16)

[8]



TECHPOWERUP

HOME REVIEWS FORUMS DOWNLOADS CASE MOD GALLERY DATABASES OUR SOFTWARE MORE CONTACT US

GPU Specs Database

Below you will find a reference list of most graphics cards released in recent years.

Recent Database Updates

Aug 3 Edited Radeon PRO W7600
Edited Radeon PRO W7500
Edited Radeon PRO W7500
Edited Radeon PRO W7600
Aug 1 Edited Radeon RX 7900 GRE

Refine Search Parameters

Manufacturer	Released	DirectX	Mobile	Workstation	IGP
All	All	All	All	All	All

Generation	Architecture	Graphics Processor	Shaders	TMUs	ROPs
All	RDNA 2.0 (52)	All	All	All	All

Memory Type	Memory Size	Memory Bus Width	Bus Interface	Slots	Power Connectors
All	All	All	All	All	All

TDP	Recommended Resolution	Production Status
All	All	All

Sort by: Generation

Reset Filter or type to Search...

[9]

AMD

Product Name	GPU Chip	Released	Bus	Memory	GPU clock	Memory clock	Shaders / TMUs / ROPs
Navi II (RX 6000)							
Radeon RX 6300	Navi 24	Never Released	PCIe 4.0 x4	2 GB, GDDR6, 32 bit	1000 MHz	2000 MHz	768 / 48 / 32
Radeon RX 6400	Navi 24	Jan 19th, 2022	PCIe 4.0 x4	4 GB, GDDR6, 64 bit	1923 MHz	2000 MHz	768 / 48 / 32
Radeon RX 6500 XT	Navi 24	Jan 19th, 2022	PCIe 4.0 x4	4 GB, GDDR6, 64 bit	2310 MHz	2248 MHz	1024 / 64 / 32
Radeon RX 6600	Navi 23	Oct 13th, 2021	PCIe 4.0 x8	8 GB, GDDR6, 128 bit	1626 MHz	1750 MHz	1792 / 112 / 64
Radeon RX 6600 XT	Navi 23	Jul 30th, 2021	PCIe 4.0 x8	8 GB, GDDR6, 128 bit	1968 MHz	2000 MHz	2048 / 128 / 64
Radeon RX 6650 XT	Navi 23	May 10th, 2022	PCIe 4.0 x8	8 GB, GDDR6, 128 bit	2055 MHz	2190 MHz	2048 / 128 / 64
Radeon RX 6700	Navi 22	Jun 9th, 2021	PCIe 4.0 x16	10 GB, GDDR6, 160 bit	1941 MHz	2000 MHz	2304 / 144 / 64
Radeon RX 6700 XT	Navi 22	Mar 3rd, 2021	PCIe 4.0 x16	12 GB, GDDR6, 192 bit	2321 MHz	2000 MHz	2560 / 160 / 64
Radeon RX 6750 XT	Navi 22	Mar 3rd, 2022	PCIe 4.0 x16	12 GB, GDDR6, 192 bit	2150 MHz	2250 MHz	2560 / 160 / 64
Radeon RX 6800	Navi 21	Oct 28th, 2020	PCIe 4.0 x16	16 GB, GDDR6, 256 bit	1700 MHz	2000 MHz	3840 / 240 / 96
Radeon RX 6800 XT	Navi 21	Oct 28th, 2020	PCIe 4.0 x16	16 GB, GDDR6, 256 bit	1825 MHz	2000 MHz	4608 / 288 / 128
Radeon RX 6900 XT	Navi 21	Oct 28th, 2020	PCIe 4.0 x16	16 GB, GDDR6, 256 bit	1825 MHz	2000 MHz	5120 / 320 / 128
Radeon RX 6900 XTX	Navi 21	Never Released	PCIe 4.0 x16	16 GB, GDDR6, 256 bit	2075 MHz	2250 MHz	5120 / 320 / 128
Radeon RX 6950 XT	Navi 21	May 10th, 2022	PCIe 4.0 x16	16 GB, GDDR6, 256 bit	1860 MHz	2250 MHz	5120 / 320 / 128

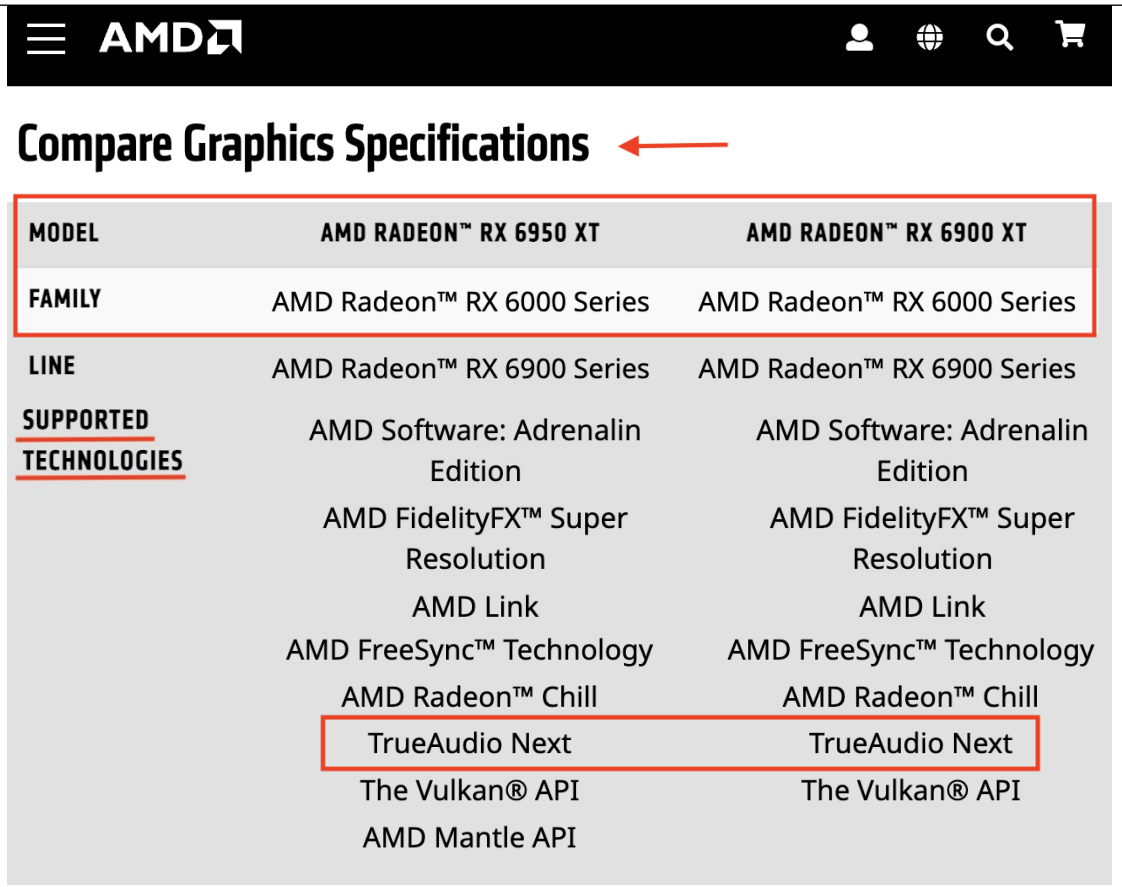
[9]

For example, the AMD ray traced audio solutions includes software (e.g. TAN library and SDK) that runs on an AMD graphics processing unit (GPU) to process concurrent audio signals in real time via path-tracing technology. Ray traced audio runs on AMD RX 5000, RX 6000, and RX 7000 series GPUs.

AMD TrueAudio Next is a software development kit for GPU accelerated and multi-core high-performance audio signal processing.

[1]

	The TAN SDK provides real time audio applications the ability to leverage the OpenCL™ toolchain and to co-exist with graphics. Accelerating game audio on the GPU frees CPU bandwidth for game physics and AI, while enabling advanced interactive acoustics modeling on many audio streams. Advanced audio processing has greatly increased compute requirements: • Physics-derived audio benefits from real-time, time-varying convolution performed on every audio source. TAN Convolution leverages the power of the GPU to provide reliable time-varying convolution for many audio sources, without blocking the graphics compute queue. • Higher-order Ambisonics rendering (3rd order or higher) adds the most environmental realism, but can require 16, 25 or 36 time-varying convolution filters per audio source. TAN makes these higher filter counts practical and simple to implement. • Most advanced audio algorithms depend on high-performance FFT or FHT (Fast Hartley Transform). The TAN library enables these algorithms to leverage the GPU. • A mixing application is included so that multiple audio sources can be mixed locally on the GPU to minimize data transfer overhead. • The TAN library may be used in conjunction with Radeon Rays as foundational accelerated algorithms for a complete physics-based audio solution. [1] AMD TrueAudio is found on-die of select AMD graphics cards and APUs. A die can house multiple AMD TrueAudio DSP cores, each having 32KiB instruction and data caches and 8KiB of scratchpad memory for local operation.[16] AMD TrueAudio SIP blocks are found on the dies of some GPUs of the AMD Radeon Rx 200 Series;[17] namely the Radeon R7 260, Radeon R7 260X, Radeon R9 285, Radeon R9 290, Radeon R9 290X and the Radeon R9 295X2, and in Kaveri and Carrizo-based APUs.[17] TrueAudio is also supported by the PlayStation 4 hardware.[18] An I²S solution is also supported for SOCs.[19][20] AMD True Audio Next is supported on RX 5000,[21] 6000,[22] and 7000[23] series GPUs. [2]

<table>
<tr><td></td><td> 

[4]</td></tr>
<tr><td>(a) receiving representations of a plurality of parallel time-slices of concurrent signals;</td><td>The Microsoft Xbox game console with ray traced audio receives representations of a plurality of parallel time-slices of concurrent signals.

For example, the ray traced audio feature uses path-tracing to model sound propagation along direct and indirect paths from an audio source to a listener. The sound propagating along the direct and indirect paths are modelled as concurrent signals, which are processed in parallel. The audio source is time sampled and digitized audio, e.g. such as sound effects in a computer game.</td></tr>
</table>

Overview Videos People Publications Groups News & features

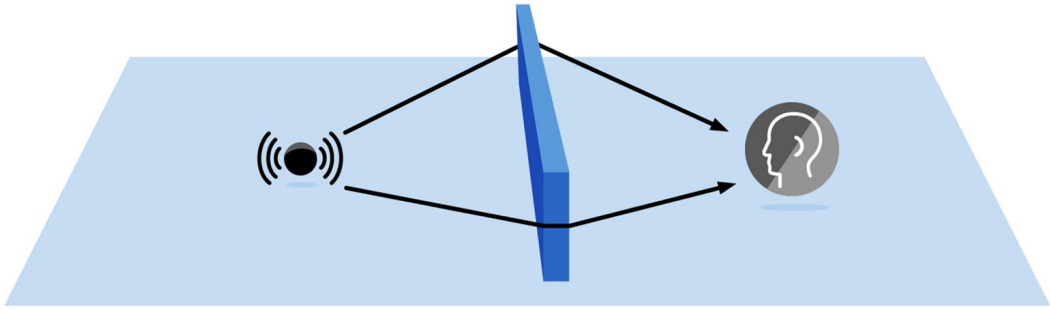
Immersive sound propagation for games and mixed reality

Games and mixed reality must render a believable soundscape for the listener that situates characters and sounds within rich 3D worlds. Project Triton aids this task by physically modeling how sound propagates within a scene given its shape and materials. In doing so, it automatically models immersive sound propagation effects like sound occlusion and reverberation. Project Triton is unique in accurately modeling the true wave physics of sound, including diffraction, while still being fast enough to scale from desktop to mobile devices. Incubated over a decade of focused research, it is battle-tested technology, shipping in major game titles like Gears of War, Sea of Thieves, and Borderlands 3.

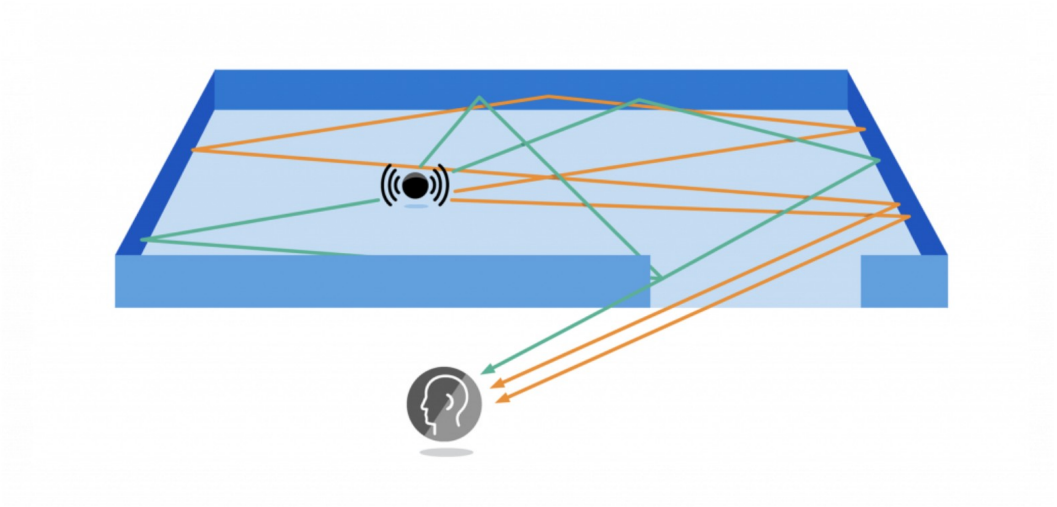
Project Acoustics provides easy-to-use plugin integration for Unity and Unreal game engines.

Sound propagation effects

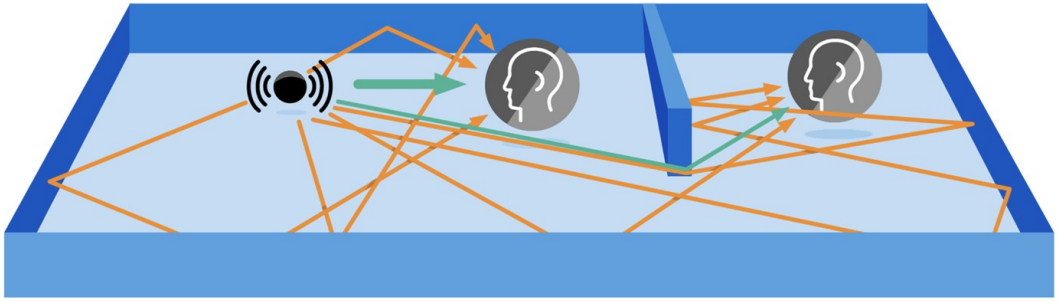
Obstruction



[10]

	Occlusion  Occlusion is total reduction in loudness from geometry, involving complex propagation and diffraction (diffracted paths in green). [10]

Reverberance



Left: Close to the source, direct path (green) is loud compared to reflections (orange), resulting in high clarity and low reverberance. Right: Behind the partition, direct path is weakened from diffraction, causing low clarity and high reverberance, conveying that the source is in a different room.

[10]

We perceive many acoustic effects in everyday life that result from the wave nature of sound propagation. They keep us aware and oriented in our surroundings, varying smoothly as we and sounds around us move through the world. Games and mixed reality thus usually need to reproduce them for a natural soundscape. Project Triton models many such important effects, illustrated above. For instance, obstruction and "portaling" together create a believable impression of sounds flowing around doorways. It is common for sound designers to have to do tedious manual markup to obtain such results. Project Triton removes this tedium, driving the effects robustly from scene geometry and empowering the designer with new tools to shape physics for storytelling goals. For example, one can reduce physical reverberance on game dialogue to make it cinematic, while heightening the reverberation on footsteps to make a cave feel spookier. All at runtime while fitting within practical CPU and RAM budgets.

[10]

	Bringing environmental sound rendering closer to real-world acoustics requires modeling of the physics that propagate sound; this is called auralization. There are multiple approaches that have been proposed and implemented for acoustic propagation modeling that make varying tradeoffs between complexity and accuracy. Perfect modeling – e.g., solving the acoustic wave equation for every sound propagation event -- is still not within practical reach of current real-time compute capabilities for VR systems, but with the power of real-time GPU compute enabled by AMD TrueAudio Next, significant improvements to auralization can be made that are not practical to achieve on CPU alone. One approach that provides a significant upgrade in realistic auralization for audio occlusion and reflections in critical frequency bands is the method of geometric acoustics. Geometric acoustics starts with ray tracing of paths (typically a sampled subset) between each sound source and the position of the listener's ears, and applies a collection of algorithms (e.g., acoustic radiance transfer) to the dataset of material properties encountered in the path bounces, to generate a unique impulse response for each sound, per ear. In addition to path reflection, diffusion and occlusion, diffraction effects (e.g., finite edge diffraction) and HRTF filters can also be modelled within this framework and superimposed into each of these time-varying impulse responses (Chandak, 2011). [5]
(b) defining an instruction sequence for a single-instruction multiple-data type parallel processor, for transform processing of the plurality of parallel time-slices of concurrent signals between distinct data representations;	The Microsoft Xbox game console with ray traced audio defines an instruction sequence for a single-instruction multiple-data type parallel processor, for transform processing of the plurality of parallel time-slices of concurrent signals between distinct data representations. For example, the ray traced audio feature performs acoustic path-tracing on an AMD GPU. The GPU performs transform processing (e.g. application of convolution filters, FFT and FHT transforms) using an instruction sequence executed on a single-instruction multiple data (SIMD) processor.

Hardware Accelerated DirectX Raytracing (DXR) – From improved lighting, shadows and reflections as well as more realistic acoustics and spatial audio, raytracing enables developers to create more physically accurate worlds. For the very first time in a game console, Xbox Series X and Xbox Series S include support for high performance, hardware accelerated raytracing. Xbox Series X and Xbox Series S use a custom-designed GPU leveraging the latest innovation from our partners at AMD and built in collaboration with the same team who developed DirectX Raytracing. Developers will be able to deliver incredibly immersive visual and audio experiences using the same techniques on PC and beyond.

[7]

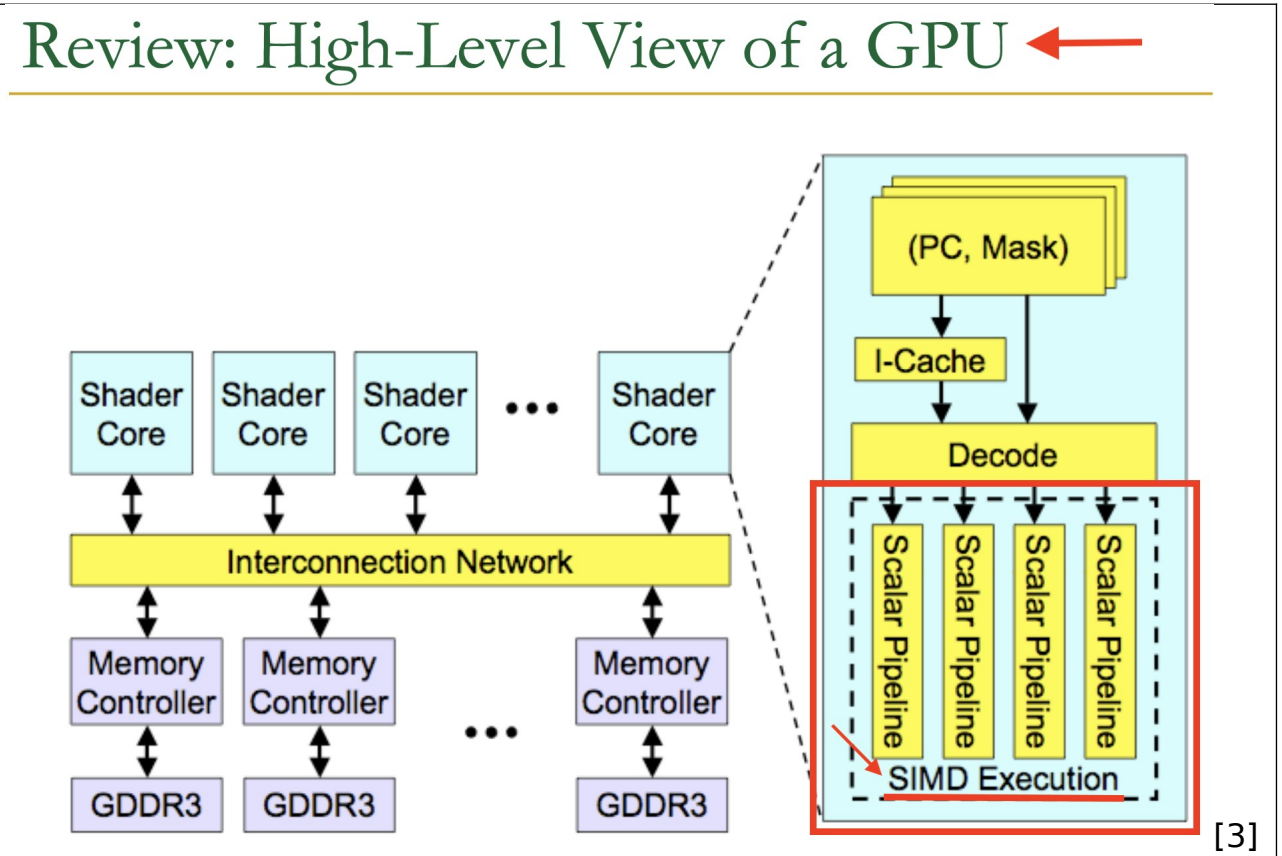
The TAN SDK provides real time audio applications the ability to leverage the OpenCL™ toolchain and to co-exist with graphics.

Accelerating game audio on the GPU frees CPU bandwidth for game physics and AI, while enabling advanced interactive acoustics modeling on many audio streams.

Advanced audio processing has greatly increased compute requirements:

- Physics-derived audio benefits from real-time, time-varying convolution performed on every audio source. TAN Convolution leverages the power of the GPU to provide reliable time-varying convolution for many audio sources, without blocking the graphics compute queue.
- Higher-order Ambisonics rendering (3rd order or higher) adds the most environmental realism, but can require 16, 25 or 36 time-varying convolution filters per audio source. TAN makes these higher filter counts practical and simple to implement.
- Most advanced audio algorithms depend on high-performance FFT or FHT (Fast Hartley Transform). The TAN library enables these algorithms to leverage the GPU.
- A mixing application is included so that multiple audio sources can be mixed locally on the GPU to minimize data transfer overhead.
- The TAN library may be used in conjunction with Radeon Rays as foundational accelerated algorithms for a complete physics-based audio solution.

[2]

	 [3]
(c) controlling the single-instruction, multiple-data type parallel processor, to process the plurality of parallel time-slices of concurrent signals according to the instruction sequence to perform the transform processing of the plurality of parallel time-slices of concurrent signals; and	The Microsoft Xbox game console with ray traced audio controls the single-instruction, multiple-data type parallel processor, to process the plurality of parallel time-slices of concurrent signals according to the instruction sequence to perform the transform processing of the plurality of parallel time-slices of concurrent signals. For example, the Ray traced audio solution dynamically changes how the acoustic path-tracing is applied to the sound propagation as source/listener positions change and the geometry of the acoustic environment changes.

	In the realtime rendering process, the impulse responses, which are continuously updated as the sources and listener change position, are convolved with the corresponding audio source signals. These signals are then mixed separately per ear to generate the output audio waveforms heard by the listener. The approach is scalable and has been implemented both on CPU and with AMD TrueAudio Next. The number of physically modelled sound sources that can be supported is significantly enhanced with TrueAudio Next; instead of being limited to a small handful of primary sound cues, an application can scale so that environmental sound sources (up to a complete soundscape of 40 to 64 sounds) can be included, by "borrowing" a small (roughly 10-15%) subset of a GPUs compute units. Quality can be scaled in even greater dimensions when multiple GPUs or combinations of APUs and GPUs are deployed. [5]
(d) outputting information from the single-instruction, multiple-data type parallel processor selectively dependent on the transform processing of the plurality of parallel time-slices streams of concurrent signals,	The Microsoft Xbox game console with ray traced audio outputs information from the single-instruction, multiple-data type parallel processor selectively dependent on the transform processing of the plurality of parallel time-slices streams of concurrent signals. For example, the information for sound propagating along a path (direct and indirect) is output to the application (e.g. computer game) depending on whether it interacts with various meshes/objects in the acoustic environment (e.g. causing occlusion, diffraction etc.) and the effect that the game designer is trying to achieve (e.g. cinematic, spooky). A mixer application provides selectivity in the inclusion of multiple sources and the effect provided by the path-tracing technology. We perceive many acoustic effects in everyday life that result from the wave nature of sound propagation. They keep us aware and oriented in our surroundings, varying smoothly as we and sounds around us move through the world. Games and mixed reality thus usually need to reproduce them for a natural soundscape. Project Triton models many such important effects, illustrated above. For instance, obstruction and "portaling" together create a believable impression of sounds flowing around doorways. It is common for sound designers to have to do tedious manual markup to obtain such results. Project Triton removes this tedium, driving the effects robustly from scene geometry and empowering the designer with new tools to shape physics for storytelling goals. For example, one can reduce physical reverberance on game dialogue to make it cinematic, while heightening the reverberation on footsteps to make a cave feel spookier. All at runtime while fitting within practical CPU and RAM budgets. [10]

	Bringing environmental sound rendering closer to real-world acoustics requires modeling of the physics that propagate sound; this is called auralization. There are multiple approaches that have been proposed and implemented for acoustic propagation modeling that make varying tradeoffs between complexity and accuracy. Perfect modeling – e.g., solving the acoustic wave equation for every sound propagation event -- is still not within practical reach of current real-time compute capabilities for VR systems, but with the power of real-time GPU compute enabled by AMD TrueAudio Next, significant improvements to auralization can be made that are not practical to achieve on CPU alone. One approach that provides a significant upgrade in realistic auralization for audio occlusion and reflections in critical frequency bands is the method of geometric acoustics. Geometric acoustics starts with ray tracing of paths (typically a sampled subset) between each sound source and the position of the listener's ears, and applies a collection of algorithms (e.g., acoustic radiance transfer) to the dataset of material properties encountered in the path bounces, to generate a unique impulse response for each sound, per ear. In addition to path reflection, diffusion and occlusion, diffraction effects (e.g., finite edge diffraction) and HRTF filters can also be modelled within this framework and superimposed into each of these time-varying impulse responses (Chandak, 2011). [5]
wherein a respective output of information is selectively dependent on a plurality of respective signals, each respective signal comprising a series of time-slices.	The output of information is selectively dependent on a plurality of respective signals, each respective signal comprising a series of time-slices. For example, the output of the ray traced audio feature is a time-varying audio signal resulting from the technique of path-tracing sound emanating from a source and propagating along direct and indirect paths in an acoustic environment, whereby the selectivity of sound sources and the effect of the path-tracing technique is selectively controlled by a mixing application. We perceive many acoustic effects in everyday life that result from the wave nature of sound propagation. They keep us aware and oriented in our surroundings, varying smoothly as we and sounds around us move through the world. Games and mixed reality thus usually need to reproduce them for a natural soundscape. Project Triton models many such important effects, illustrated above. For instance, obstruction and "portaling" together create a believable impression of sounds flowing around doorways. It is common for sound designers to have to do tedious manual markup to obtain such results. Project Triton removes this tedium, driving the effects robustly from scene geometry and empowering the designer with new tools to shape physics for storytelling goals. For example, one can reduce physical reverberance on game dialogue to make it cinematic, while heightening the reverberation on footsteps to make a cave feel spookier. All at runtime while fitting within practical CPU and RAM budgets. [10]

	The TAN SDK provides real time audio applications the ability to leverage the OpenCL™ toolchain and to co-exist with graphics. Accelerating game audio on the GPU frees CPU bandwidth for game physics and AI, while enabling advanced interactive acoustics modeling on many audio streams. Advanced audio processing has greatly increased compute requirements: • Physics-derived audio benefits from real-time, time-varying convolution performed on every audio source. TAN Convolution leverages the power of the GPU to provide reliable time-varying convolution for many audio sources, without blocking the graphics compute queue. • Higher-order Ambisonics rendering (3rd order or higher) adds the most environmental realism, but can require 16, 25 or 36 time-varying convolution filters per audio source. TAN makes these higher filter counts practical and simple to implement. • Most advanced audio algorithms depend on high-performance FFT or FHT (Fast Hartley Transform). The TAN library enables these algorithms to leverage the GPU. • A mixing application is included so that multiple audio sources can be mixed locally on the GPU to minimize data transfer overhead. • The TAN library may be used in conjunction with Radeon Rays as foundational accelerated algorithms for a complete physics-based audio solution. [1]

Product List

Xbox Series X game consoles
Xbox series S game consoles

References

[1] AMD GPUOpen - Ray traced audio - The SDK for accelerated GPU and multi-core audio
https://gpuopen.com/true-audio-next/

[2] Wikipedia – AMD TrueAudio
https://en.wikipedia.org/wiki/AMD_TrueAudio

[3] Computer Architecture: SIMD and GPUs
https://course.ece.cmu.edu/~ece740/f13/lib/exe/fetch.php?media=onur-740-fall13-module5.1.3-simd-and-gpus-part3-vliw-dae-systolic.pdf

[4] AMD – Compare Graphics Specifications
https://www.amd.com/en/products/specifications/compare/graphics/11836,10526

[5] Whitepaper - AMD TrueAudio Next – The right next step for audio on VR - Carl Wakeland, Fellow Design Engineer, AMD
https://gpuopen.com/wp-content/uploads/2016/07/TAN_whitepaper_2016.pdf

[6] Notebook Check - Ray traced audio acceleration is the latest gimmick on Microsoft's Xbox Series X console
https://www.notebookcheck.net/Ray-traced-audio-acceleration-is-the-latest-gimmick-on-Microsoft-s-Xbox-Series-X-console.454763.0.html

[7] News Xbox.com - Defining the Next Generation: An Xbox Series X|S Technology Glossary
https://news.xbox.com/en-us/2020/03/16/xbox-series-x-glossary/

[8] TechPowerUp - AMD Xbox Series X GPU
https://www.techpowerup.com/gpu-specs/xbox-series-x-gpu.c3482

[9] TechPowerUp - GPU Specs Database
https://www.techpowerup.com/gpu-specs/?architecture=RDNA+2.0&sort=generation

[10] Microsoft – Project Triton
https://www.microsoft.com/en-us/research/project/project-triton/